Chapter 9 Land Use

This chapter describes the existing land uses and potential changes in land use associated with the proposed project alternatives. Additional land use discussion and methodology are provided in Appendix H.

9.1 Existing Conditions

9.1.1 Project Site

The proposed mining would occur on two portions of the project site referred to as the "Upper Site" and "Lower Site." These two portions of the site, connected by an operational easement that was retained as part of Weyerhaeuser Company's conveyance of intervening parcels pursuant to the 1998 Middle Fork/Grouse Ridge Memorandum of Understanding (MOU), are a single, contiguous site for permitting purposes.

The Lower Site, at the base of Grouse Ridge, lies at an elevation of approximately 690 feet above sea level and contains a gravel pit. The Upper Site is at the top of Grouse Ridge, at approximately Elevation 1,600. Both sites are owned by the Weyerhaeuser Company and are used for forest production. Most of the forested area on the sites has been logged and is in various stages of new tree growth. There are no authorized recreational uses of the sites.

Access to the 115-acre Lower Site is via SE 146th Street and a private gravel road. Grouse Ridge Road meanders throughout the Lower Site. The 578-acre Upper Site is accessed from the west by the gravel SE Grouse Ridge Road and from the southeast by the paved SE Grouse Ridge Road. SE Grouse Ridge Road meanders throughout the Upper Site.

Permit information on file with King County for previous activities on the Lower Site indicates that gravel mining on the site was initiated in approximately 1946 and continued until approximately 1993. The Lower Site was listed as an active mining site in the 1960 *Inventory of Washington Minerals* (Washington State Department of Conservation). In addition to gravel mining, the Lower Site has served as a site for the placement of, or resale of, fill material from 1985 to 1991, and again in 1997. Weyerhaeuser continues to use the site for a source of gravel for its forestry road construction on an intermittent basis.

9.1.2 Site Vicinity

9.1.2.1 General Character

The Snoqualmie Valley is a rural area characterized by river floodplains, upland plateaus, and foothills of the Cascade Mountains. The river valley floor is relatively flat and has the most intensively developed land uses, such as those in North Bend and in the vicinity of freeway interchanges. The topography of hillsides surrounding the valley floor allows only limited development and has shaped the land-use pattern of the area. I-90 is a major built feature in the area.

The general land-use pattern of the Upper Snoqualmie Valley consists of suburban-type uses within the Cities of Snoqualmie and North Bend, dispersed residential development surrounding the cities, resource lands including forestry and mining uses, and recreational uses in the foothills of the Cascade Mountains. The area in the immediate vicinity of the I-90 interchange contains a mix of commercial, light industrial, and residential land uses.

9.1.2.2 Specific Land Uses

Figure 9-1 provides an aerial view of the area within approximately 1 mile of the Lower and Upper Sites. Land uses within this area include auto/truck-oriented retail, commercial establishments, residential subdivisions, dispersed rural residential homes, small farms, two active mining operations, two state parks, designated hiking trails, and forest lands.

Lower Site

To the immediate west of the Lower Site is an approximately 1,000-foot-wide strip of forest land. Beyond the forest land to the west, along 468th Avenue SE, is a concentration of auto-oriented retail uses (motel, restaurants, gas stations, and auto/truck repair businesses) commonly referred to as Seattle Truck Town East. Farther west, along SE North Bend Way, is forest land, commercial uses (motel and truck repair businesses), and several trailer parks. To the immediate northwest is partially cleared forest land, the SE 144th Street roadway, and businesses with associated outdoor storage and parking. Farther northwest, across 468th Avenue SE, are scattered residences, a forest products business, and the approximately 3-year-old WoodRiver subdivision—which contains about 110 homes on approximately 1-acre lots (see Figures 9-1 and 9-2).

To the immediate north of the Lower Site is a dirt and gravel public roadway (SE 144th Street), and the Lu residence and associated grounds. Several homes are north of SE 144th Street and on 476th Avenue SE and 475th Avenue SE. Farther north is SE Middle Fork Road and SE Lake Dorothy Road, both of which generally parallel the Middle Fork of the Snoqualmie River. Land uses along SE Middle

Fork Road to the north include a King County Department of Public Works storage yard, forested areas, and several rural residential subdivisions with approximately 1-acre lots (including the 20-lot River Ridge subdivision). The 1999 Snoqualmie Valley School District Capital Facilities Plan identifies the undeveloped parcel at the northeast corner of 468th Avenue SE and SE Middle Fork Road as the site for a new middle school. The District anticipates that the middle school will be constructed in 2004. Although not identified in the 1999 Plan, it is also possible that an elementary school could be built on the site in the future as enrollments warrant.

To the immediate east of the Lower Site is forest land with trees in various stages of growth. Farther east, along both SE Middle Fork Road and SE Lake Dorothy Road, are scattered homes, the Vallley Camp operated by the Lutheran Church, and the Middle Fork Snoqualmie River Day Use Area operated by the Washington State Department of Natural Resources (WDNR). The highest concentration of residences in the area to the east is along SE Middle Fork Road, near the intersection with SE Lake Dorothy Road, where approximately 10 to 15 homes are on lots ranging from approximately 1 to 5 acres.

To the immediate south is a right-of-way for I-90. Farther south, across I-90 on SE 153rd Street, is a rural-residential subdivision with about 40 homes on approximately 1-acre lots. Beyond this residential subdivision is a primarily forested area with interspersed homes, small farms, and Twin Falls State Park.

Upper Site

To the immediate west of the Upper Site is an approximately 1,200-foot-wide forested area. Farther west, and approximately 750 feet lower than the Upper Site, is I-90. West of I-90 is an area with forest land and dispersed residences. The residential subdivision along SE 153rd Street is within this area.

To the immediate south of the Upper Site is an approximately 1,400-foot-wide forest area that includes the Homestead Valley Mine and the South Fork Snoqualmie River. Farther south, and at an elevation approximately 650 feet lower than the Upper Site, is I-90. South across I-90 is a mostly forested area with scattered homes, small farms, and Olallie State Park.

The Washington State Patrol Fire Training Academy lies immediately east of the proposed Upper Site mining area. Farther east is forest land.

Immediately north of the Upper Site is an approximately 2,000-foot-wide area of forest in various stages of growth. Farther north, at an elevation approximately 700 feet lower than the top of the Upper Site, are residential homes, small farms, and forest lands along SE Middle Fork Road and SE Lake Dorothy Road. The WDNR Middle Fork Snoqualmie River Use Area starts at the terminus of the paved portion of SE Lake Dorothy Road; this facility provides approximately 9 miles of hiking trails

to Mailbox Peak and Granite Lakes. The Middle Fork Snoqualmie River is farther north.

9.1.3 Existing Land Use Designations

9.1.3.1 Project Site

The King County Comprehensive Plan (1994) identifies the Upper and Lower Sites and immediately surrounding area as Forest and within the Forest Production District. According to the Comprehensive Plan, "the primary land use within the Forest Production District should be commercial forestry. Other resource uses, such as mining and agriculture, should be permitted within the Forest Production District when managed to be compatible with forest management." In addition, the King County Comprehensive Plan Mineral Resources Map identifies both the Lower and Upper Sites as "Potential Surface Mineral Resource Sites." The Comprehensive Plan discussion on Designated and Potential Mineral Resource Sites states "Identification of Potential Mineral Resource Sites satisfies GMA (Growth Management Act) requirements to not knowingly preclude opportunities for future mining and to inform nearby property owners of the potential for future mining use of these areas in order to prevent or minimize impacts" (1994 King County Comprehensive Plan with 1999 Update, Chapter 6, Natural Resource Lands).

The King County Zoning Code implements the Comprehensive Plan's policies and objectives. The proposed sites are zoned F (Forest) under Title 21A (Figure 9-2). The F zone includes mining and processing as a permitted use. Mining operations are permitted outright on Forest lands if mining activities are more than 1/4 mile from an established residence and do not use local access streets that abut lots developed for residential use (King County Code [KCC] 21A.08.090(B)(9)). Otherwise, a Conditional Use Permit (CUP) is required. Asphalt and concrete-processing activities are permitted only if they are accessory to a primary mineral extraction use or are a continuation of an existing mineral processing use (KCC 21A.08.090(B)(8)). New residential use in the F zone is limited to residential lots a minimum of 80 acres in size.

9.1.3.2 Site Vicinity

Lower Site

Figure 9-2 illustrates the zoning pattern in the proposed project site vicinity. To the immediate west of the Lower Site is an undeveloped strip of land zoned Rural Area, which allows one dwelling unit per 10 acres (RA-10). Access to this RA-10 area is provided by SE 146th Street, which also provides primary access to the Lower Site. Farther west, along 468th Avenue SE, are parcels zoned Regional Business (RB) and Industrial (I). The RB parcels contain auto-oriented retail uses, and the I parcels contain businesses with associated outdoor storage and parking. Properties along SE North Bend Way to the west are zoned RB and

contain a mix of forestry, commercial, and residential (trailer park) uses. To the northwest is a relatively large area zoned Rural Area, one dwelling unit per 2.5 acres (RA-2.5). This RA-2.5-acre area contains the WoodRiver subdivision and scattered residential uses. The WoodRiver subdivision was vested and developed under the prior General Zone category, which allowed a minimum lot size of 35,000 square feet. To the south and southwest, across I-90, is a relatively large area zoned RA-5.

Properties to the immediate north of the Lower Site are zoned RA-5, RA-10, and Industrial. The RA-5 zoned area contains several single-family homes, and the RA-10 zoned area contains the Lu residence. Farther north, encompassing a portion of the area bisected by SE Middle Fork Road and SE Lake Dorothy Road, the zoning is RA-5 and RA-10. This area contains several rural subdivisions and scattered residences. To the northeast, along SE Middle Fork Road and SE Lake Dorothy Road, properties are zoned F. The primarily forested area east of the Lower Site is zoned F.

Upper Site

Areas to the immediate north, south, east, and west of the Upper Site are zoned F. The primary land use in this area is forest production. The area to the north does, however, contain some single-family residences, and the area to the east contains the Fire Training Academy. The area farther south, across I-90, is zoned RA-10.

9.1.4 Density and Distribution of Residences

The distribution and density of residential uses within the approximately 2-mile vicinity of the site varies greatly and generally corresponds with the residential density allowed by zoning.

9.1.4.1 Lower Site

The area west of the Lower Site, in the vicinity of the City of North Bend is primarily zoned RA-2.5, RA-5, RB, and I. This area contains the majority of residences in the project vicinity and the highest residential densities. The WoodRiver subdivision to the west, the Riverbend subdivision farther west across I-90, and the subdivision to the south across I-90 contain the highest concentration of residences. The WoodRiver subdivision contains about 110 homes on an approximately 120-acre site, with an overall residential density of approximately one home per acre. The Riverbend subdivision contains about 380 homes on an approximately 175-acre site, with an overall residential density of approximately two homes per acre. The subdivision south of the Lower Site, across I-90, contains about 40 homes on an approximately 45-acre site, with an overall residential density of approximately 0.9 homes per acre. Other concentrations of residential uses in the area west of the site include several trailer parks and small subdivisions along SE North Bend Way.

The area north of the Lower Site, which is zoned RA-10 and RA-5, contains some residential uses, but at a lower residential density than the area to the west. To the immediate north of the Lower Site is the Lu residence, a single-family home on an approximately 5-acre lot along SE 144th Street, and approximately eight homes on 1- to 5-acre lots on 476th Avenue SE and 475th Avenue SE. The Lu residence and homes on 144th Street, 476th Avenue SE, and 475th Avenue SE are the closest residences to the proposed mining and processing areas. Along SE Middle Fork Road and SE Lake Dorothy Road are several subdivisions with approximately 1-acre lots, and scattered residences on lots ranging from approximately 1 to 10 acres in size.

Based on demographic comparison information derived from the Claritas Inc. database, information on the number of households and population of the area was obtained for the year 2000. The area within 1 mile of the western boundary of the Lower Site contained a population of 58, with 22 households. The area within 3 miles of the western boundary of the Lower Site contained a population of 4,302, with 1,492 households.

9.1.4.2 Upper Site

The area surrounding the Upper Site contains a low residential density. The area immediately surrounding the Upper Site is primarily in forestry use and contains no residential uses. Farther north, approximately 0.5 mile from the Upper Site, are several single-family homes and small farms along SE Middle Fork Road and SE Lake Dorothy Road. The residential density of this small area is approximately one dwelling unit per 2 acres.

To the south, across I-90, is a mostly forested area with scattered small farms and homes. The residential density in this area is approximately one unit per 40 acres.

Based on demographic comparison information derived from the Claritas, Inc. database, information on the number of households and population of the area was obtained for 2000. The area within approximately 1 mile of the northern boundary of the Upper Site contained a population of 7, with 3 households. The area within approximately 3 miles of the northern boundary of the Upper Site contained a population of 714, with 263 households.

As indicated by the above data, the area within 3 miles of the northern boundary of the Lower Site has a significantly higher population and number of households than does the area within 3 miles the Upper Site.

9.2 Environmental Impacts

9.2.1 Construction Impacts

9.2.1.1 Alternative 1–No Action

Under Alternative 1, no construction activity related to the proposed project would occur on the sites. A potential land use would be the harvesting of trees on the site. Compared to the Proposal, land use impacts from harvesting would be similar to those anticipated from clearing of land prior to commencement of mining activity. Clearing for mining activity under Alternatives 2 and 3 would be limited to about 35 percent of the Lower Site and 40 percent of the Upper Site. The amount of site area harvested under Alternative 1 would likely be greater than the area proposed to be cleared for mining.

9.2.1.2 Alternative 2-Proposal: Lower and Upper Sites Mining - Exit 34 (Including Limited Lower Site Mining)

Under Alternative 2, phased clearing and construction of processing facilities on both the Upper and Lower Sites and the conveyor belt would increase levels of noise, dust, and truck traffic, which would impact adjacent land uses. The phased clearing of vegetation and establishment of processing facilities on the sites would result in an intensity level similar to those of historical forest practices. Construction activities would be short-term and not be anticipated to result in significant land use impacts.

9.2.1.3 Alternative 3-Lower and Upper Sites Mining - Exits 34 and 38

Under Alternative 3, land use conditions during clearing of the sites would be the same as under Alternative 2. The noise, dust, and traffic associated with construction of the aggregate processing facility would be transferred from the Lower Site to the Upper Site. Construction activities would be short-term and not anticipated to result in significant land use impacts. Overall, construction conditions would be similar to those for Alternative 2.

9.2.1.4 Alternative 4-Upper Site Mining - Exit 38

Under Alternative 4, no construction impacts related to the Proposal would occur on the Lower Site. Construction impacts on the Upper Site would be similar to those under Alternative 2. Overall, construction impacts would be less than under Alternative 2.

9.2.2 Operation Impacts

9.2.2.1 Alternative 1–No Action

Under Alternative 1, no sand and gravel mining for commercial sales or processing activities would occur on the Upper and Lower Sites. Existing site conditions, including the deposition of fill material on the Lower Site, would continue. Harvesting of trees on both the Lower and Upper Sites may continue, which would generate a level of activity (level of noise, dust, traffic) less than that under the proposed sand and gravel mining. Forest practice activity on the sites would occur over a shorter period of time than proposed mining. If the Weyerhaeuser Company were to offer for sale either of the sites, the Mountains to Sound Greenway Trust would have a 90-day option period to notify the Weyerhaeuser Company if it intends to purchase at the appraised price. Site lands acquired by the Mountains to Sound Greenway Trust would be conveyed to a public agency for management.

9.2.2.2 Alternative 2-Proposal: Lower and Upper Sites Mining - Exit 34

Land Use

The primary land use impacts from the proposed project relate to displacement of existing uses, relationship of the type and intensity (such as levels of traffic and noise) of proposed uses to surrounding uses, and indirect land use impacts associated with potential peripheral development resulting from changes or intensification in land use at the sites.

Displacement. The Proposal would result in the conversion, in phases, of approximately 260 acres of existing forest production land at the 578-acre Upper Site to sand and gravel mining for an approximately 25-year period. No more than 50 acres would be in active mining at any one time. Existing forestry uses of the Upper Site would be foreclosed during mining of each phase of the project. As mining within each phase is completed, mined areas would be revegetated with Douglas fir trees for future forestry use, consistent with the zoning and Comprehensive Plan designations of the Upper Site. The time to complete each mining phase would depend on market conditions, although it is anticipated that each phase would be completed in approximately 5 years. No permitted uses on the Upper Site would be permanently foreclosed.

Implementation of the Proposal on the 115-acre Lower Site would result in the conversion (for up to 25 years) of approximately 40 acres of forest production for sand and gravel mining, and establishment of processing and possibly concrete and asphalt batch plant facilities. Consistent with the MOU, as mining is performed, each completed segment would be reclaimed, replanted, and donated to WDNR in trust for King County. No permitted uses on the Lower Site would be permanently foreclosed by the

mining and reclamation activities; however, under the stipulations of the MOU, future uses of the sites would be limited to forestry or open space.

According to the Forest zone provisions of the King County Zoning Code, permitted uses on the sites include forestry and mining. Because concrete and asphalt batching is only allowed when accessory to a primary mineral extraction use or as a continuation of an established mineral processing use, upon completion of these mining operations, such activity would not be permitted on the site.

Relationship to Surrounding Uses. The relationship of the proposed project land uses with surrounding land uses is primarily a function of the intensity of the proposed uses (such as level of noise, dust, and traffic), intensity of the surrounding uses, proximity of proposed uses to surrounding uses, and existence of buffers or barriers between proposed and surrounding uses.

Phased clearing and long-term mining and processing operations on the Upper and Lower Sites (including sand and gravel mining on both the site portions, and eventual asphalt and concrete processing on the Lower Site) would increase levels of noise, dust, and truck traffic (intensity level). The intensity level on the sites during mining and processing would be similar in character to the intensity level of I-90 and somewhat greater than that of the commercial area along 468th Avenue SE. The intensity level on the sites during mining and processing would be substantially greater than the existing intensity levels of the residential and recreational uses in the area.

Clearing of vegetation on the sites would result in an intensity level similar to those of historical forest practices. Mining and processing would result in a higher level of intensity, and for a longer period of time, than would forest practices.

If permits are issued for the mine, the Mountains to Sound Greenway Trust will have a 2-year option to purchase properties determined not to be needed for the mining operation. As mining is performed in segments, each completed segment would be reclaimed, replanted, and donated to WDNR in trust for King County. When mining has been completed, all of the mine parcels would have been donated to WDNR in trust for King County.

Lower Site. Proposed mining and processing activity on the Lower Site (consisting of approximately 40 acres of the 115-acre site) would occur approximately 1,300 feet (1/4 mile) from two residential properties, including the Lu residence, both north of SE 144th Street and also the 30-acre industrial site on the same street. This activity would also be just greater than 1/4 mile from single-family residences on 476th Avenue SE and 475th Avenue SE. (Refer to Land Use Designations, below, for discussion of the 1/4-mile requirement.) The mining/processing area final floor elevation of 640 feet would be approximately 120 feet lower than the Lu residence and the single-family residences, with some visibility of the mining/processing area on the

Lower Site from these areas. The proposed mining and processing activity at the Lower Site would result in a level of intensity significantly greater than the Lu residence and single-family residential uses to the north. The proposed berm along the northern edge of the mining and processing area would minimize visual and noise impacts on the area to the north, although the mining operation could still be seen and heard. (Refer to Chapter 5, Noise, and Chapter 12, Aesthetics, Light and Glare for discussion of visual and noise impacts.) The intensity level of the mining/processing activities, as perceived by the uses in the area to the north, would, however, be greater than the existing single-family and Lu residence uses and would be considered a moderate impact.

The proposed mining and processing activity on the Lower Site would be a minimum of approximately 1/4 mile from the auto/truck commercial uses (motel, gas stations, and auto repair businesses) and future middle school on 468th Avenue SE to the west and north. Although there would not be a significant amount of elevation difference buffering the proposed mining/processing area and commercial uses to the west, the intensity level of the proposed mining and processing uses would be similar to that of the auto/truck commercial uses.

With the intervening residential and commercial uses, an approximately 2,000-foot separation, it is not anticipated that the future school use would be significantly impacted by proposed mining activities. The potential for land use impacts to the future school from proposed mining on the Lower Site is primarily a function of noise, air quality, traffic congestion, and safety. The traffic analysis prepared for this EIS indicates that the additional truck traffic from mining and processing on the Lower Site would conflict with school traffic and pedestrians in the vicinity of 468th Avenue SE/SE North Bend Way/I-90 ramps, but truck traffic impacts at the school site are not anticipated. The noise and air quality analyses did not identify any significant noise or air quality impacts at the school site from mining activities. No significant land use impacts to the school site would be anticipated.

The residential subdivision accessed from SE 153rd Street, south of I-90, is more than 1/4 mile from the proposed mining/processing area on the Lower Site. The final floor elevation of the mining/processing area would be similar to that of the subdivision to the south. Because the section of I-90 between the Lower Site and the subdivision is approximately 60 to 80 feet higher than the Lower Site and the subdivision, and because I-90 has a relatively high level of intensity, I-90 provides a separation between the Lower Site and the subdivision to the south. Considering the separation provided by I-90, the proposed mining/processing use on the Lower Site would not be anticipated to significantly impact these residential uses to the south.

The WoodRiver subdivision is approximately 5,000 feet (1 mile) from the proposed mining/processing area on the Lower Site. The intensity level of the proposed mining and processing activity would be significantly greater than the intensity level of the WoodRiver subdivision. The

proposed approximately 100-foot-high western pit wall, the location of commercial uses between the Lower Site and WoodRiver, and the approximate 1-mile separation would buffer WoodRiver from the proposed mining/processing activity, and the Proposal is not, however, anticipated to significantly impact residential uses at WoodRiver.

Upper Site. The proposed mining area on the Upper Site (consisting of 260 acres of the 578-acre site) would be approximately 1 mile from the single-family residential homes along SE Lake Dorothy Road. The top of the ridge surrounding the mining area on the Upper Site would be approximately 900 feet higher than the residential uses along SE Lake Dorothy Road, and direct views to the mining activity are not expected. The proposed mining at the Upper Site would result in a level of intensity significantly greater than the intensity level of residential uses along SE Lake Dorothy Road. Because of the distance and elevation difference between the proposed mining area on the Upper Site and residences along SE Lake Dorothy Road, and the proposed retention of a vegetated berm around the edge of the mining area; however, the proposed use would not be anticipated to significantly impact these residential uses.

The Fire Training Academy and the Homestead Valley Mine are both approximately 1,000 feet from the proposed mining activity at the Upper Site. Because the intensity level of the proposed mining would be generally similar to that of the Fire Training Academy and the Homestead Valley Mine, proposed mining at the Upper Site would be considered generally consistent with these uses.

Proposed mining activities on the Upper Site would be located approximately 2,000 feet from residences to the south along SE 172nd Street. Because of topographic separation between the Upper Site and these residences and the limited amount of mining-related truck traffic on SE Homestead Valley Road, significant land use impacts to residential uses on SE 172nd Street would not be anticipated.

Indirect Impacts. The mining of the site's sand and gravel resources would not be expected to generate significant indirect land use impacts. Uses of the type and scale proposed do not typically generate spin-off uses. Mining would not be expected, for example, to create a significant demand for commercial or residential uses to support and service planned operations or to house employees. Similarly, mining is not expected to generate cumulative adverse land use impacts. It would not, for example, be expected to change the general character of the area. Mining is a resource land use that is comparable to historical forest production activities.

Land Use Designations

The King County Zoning Code allows mining operations as an outright permitted use in the F zone if mining activities are more than 1/4 mile from an established residence and do not use local access streets that abut lots developed for residential use (KCC 21A.08.090(B)(9)).

Asphalt/concrete mixtures and block activities are permitted in the F zone only if they are accessory to a primary mineral extraction use or are a continuation of mineral processing use established prior to the effective date or consistent with County code (KCC 21A.08.090(B)(8)).

The Lu residence and other homes along SE 144th Street, 476th Avenue SE, and 475th Avenue SE, and homes in the subdivision accessed from SE 153rd Street, are the closest established residences to proposed mining operations. For the purposes of the KCC 21A4.08.090(B)(9), King County has determined that the residential accessory structure on the Lu property is an established residence, and is within 1/4 mile of the proposed mining activities on the Lower Site; therefore, a CUP would be required for mining activities on the Lower Site under Alternative 2. Refer to the Relationship to Plans and Policies section in the *Land Use Technical Report* (Appendix H) for additional detail.

The proposed primary access to the Lower Site (SE 146th Street) abuts two lots zoned Rural Area-10 (RA-10). Although zoned residential, the lots are not developed with residential structures and are therefore not "developed for residential use" for purposes of KCC 21A.08.090(B)(9). The Edgewick Inn is located on a Regional Business (RB) zoned property at the southeast corner of SE 146th Street/468th Avenue SE. According to section 21A.08.030 of the King County Zoning Code, hotel/motel use (Standard Industrial Classification [SIC] #7011) is a commercial use, not a residential use, and is only allowed in commercial zones. Accordingly, the proposed access to the Lower Site from SE 146th Street would not abut lots developed for residential use and access would not trigger the need for a CUP.

CUP approval is not required for the placement of passive noise attenuation berms within the 1/4-mile area. Such berms do not constitute "mining activities" for the purposes of KCC 21A.08.090(B). The berms do not play an active role in the mineral excavation or processing operation or generate mining activity impacts which the CUP 1/4-mile threshold is intended to address.

Proposed mining activities on the Upper Site would be located approximately 2,000 feet from residences to the south of the site along SE 172nd Street, and a CUP would not be required for mining on the Upper Site. The existing F and RA zoning designations in the vicinity of the Upper and Lower Sites would restrict future residential densities and thereby limit potential conflicts between proposed mining activities and a greater number of residences.

9.2.2.3 Alternative 2A-Upper Site Mining and Limited Lower Site Mining - Exit 34

Under Alternative 2A, overall land use impacts related to surrounding land uses and indirect spin-off impacts would be similar to those under Alternative 2. Compared to Alternative 2, Alternative 2A would result in

a lesser displacement of forest production land. Because mining activity on the Lower Site under Alternative 2A would be located more than 1/4 mile from the accessory structure on the Lu property, a CUP would not be required.

9.2.2.4 Alternative 3-Lower and Upper Sites Mining - Exits 34 and 38

Under Alternative 3, land use conditions during early phases of the proposed mining operation (prior to establishment of the processing facilities) would be identical to those under Alternative 2. Upon completion of the mining of sand and gravel at the Lower Site, aggregate processing facilities would be located at the Upper Site and, as with Alternative 2, asphalt and concrete processing facilities would be established at the Lower Site. Relocation of the aggregate processing facility to the Upper Site would transfer a portion of the dust, noise, and traffic to the Upper Site. With the asphalt and concrete processing facilities located at the Lower Site, land use compatibility impacts from mining/processing at the Lower Site would, however, be similar to those under Alternative 2, particularly in relation to the Lu residence and single-family residential uses to the immediate north of the Lower Site. A CUP would be required for Alternative 3 because mining activities at the Lower Site would be within 1/4 mile of an established residence.

Relocation of the aggregate processing facility to the Upper Site would transfer a generator of dust, noise, and truck traffic to the Upper Site, farther from residential uses in the vicinity of the Lower Site.

Land use impacts to Olallie State Park and homes in the vicinity of SE Homestead Valley Road and SE 172nd Street would primarily result from increased noise (including noise from truck traffic), air quality, and pedestrian and vehicular safety. The noise analysis conducted for this EIS indicated that truck traffic associated with Alternative 3 would generate a "serious" noise increase (as defined by EPA) in the vicinity of Exit 38 (see Chapter 5, Noise). The traffic analysis indicated that the increased truck traffic associated with Alternative 3 would conflict with existing vehicle, bicycle, and pedestrian traffic along SE Homestead Valley Road and Olallie State Park (see Chapter 14, Transportation). The air quality analysis did not identify any significant air quality impacts associated with mining or truck traffic (see Chapter 4, Air Quality). Although no direct land use impacts to Olallie State Park or homes in the vicinity of 172nd Street would occur, land use impacts related to increased truck traffic and noise levels under Alternative 3 would be greater than under Alternative 2 and somewhat less than under Alternative 4.

The process for offering lands for purchase by the Mountains to Sound Greenway Trust and donation to King County under Alternative 3 would be identical to that under Alternative 2.

9.2.2.5 Alternative 3A-Upper Site Mining and Limited Lower Site Mining - Exits 34 and 38

Under this option, overall land use impacts related to surrounding land uses and indirect spin-off impacts would be similar to those discussed for Alternative 3. The option would, however, result in less displacement of forest land. A CUP would not be required for Alternative 3A because mining activity at the Lower Site would be more than 1/4 mile from an established residence.

9.2.2.6 Alternative 4-Upper Site Mining - Exit 38

Under Alternative 4, no mining or processing activities would occur on the Lower Site, which would remain in forestry use. Land use impacts from noise, air quality, and visual changes related to mining on the Lower Site would not occur. In the future, timber harvesting would occur on the site, which would generate increased levels of dust, noise, and truck traffic. Forest production activities on the Lower Site would, however, occur over a significantly shorter period than would mining under Alternative 2 and 3, and overall land use impacts would be less.

Mining conditions at the Upper Site, and the resultant potential for direct land-use impacts, would be generally similar to those discussed for the Proposal. Truck traffic on Homestead Valley Road would, however, increase compared to Alternatives 2 and 3. It is likely that a Shoreline Substantial Use Permit would be required for required improvements to the bridge crossing the South Fork of the Snoqualmie River.

Land use impacts to Olallie State Park and homes in the vicinity of SE Homestead Valley Road and SE 172nd Street would primarily result from increased noise (including noise from truck traffic), air quality, and pedestrian and vehicular safety. The noise analysis conducted for this EIS indicated that truck traffic associated with Alternative 4 would generate a "serious" noise increase as defined by EPA in the vicinity of Exit 38. The traffic analysis indicated that the increased truck traffic associated with Alternative 4 would conflict with existing vehicular, bicycle and pedestrian traffic along SE Homestead Valley Road and Olallie State Park. The air quality analysis did not identify any significant air quality impacts associated with mining or truck traffic. Although no direct land use impacts to Olallie State Park or homes in the vicinity of 172nd Street would occur, land use impacts related to increased truck traffic and noise levels would be greater than under Alternatives 2 and 3.

Because no mining would occur on the Lower Site, there would be no obligation to donate the parcel to WDNR in trust for King County as forest land or open space. However, Mountains to Sound Greenway Trust (and, in turn, WDNR and King County) would have the option to purchase these lands if Weyerhaeuser Company does not need them for mining activities. The process for offering Upper Site land for purchase by the Mountains to Sound Greenway Trust and donation to King County

would be identical to that under Alternative 2. Alternative 4 would not trigger the requirement for a CUP because mining activity would not occur within 1/4 mile of an established residence.

9.2.2.7 Relationship to Existing Plans and Policies

The location of allowed mineral resource areas in King County is guided by state and local policies, primarily the State of Washington Growth Management Act (GMA), the King County Comprehensive Plan, and the King County Zoning Code.

The State of Washington GMA, enacted by the 1990 legislature and amended frequently since, contains a comprehensive framework for managing growth and coordinating land use planning. The GMA's general planning goals include directing growth to urban areas, reducing sprawl, providing efficient transportation systems, maintaining and enhancing resource-based industries, and protecting the environment. All urban counties, including King County, and their cities are required to develop and adopt comprehensive plans and regulations to implement these plans.

Goal 8 of the GMA indicates that jurisdictions must adopt development regulations to ensure the conservation of agricultural, forest, and mineral resource lands and the protection of critical areas (see RCW 36.70A.020(8). Guidelines of the GMA recommend that mineral resource lands include areas from which the extraction of minerals occurs or can be anticipated, including land with long-term commercial significance for extracting sand and gravel. Mineral resource lands should not be land already characterized by urban growth (RCW 36.70A.170). Lands adjacent to mineral resource lands shall not interfere with the continued use of mineral resource lands (RCW 36.70A.060(1)).

Consistent with the requirements of the GMA, a new King County Comprehensive Plan (Plan) was adopted in 1994. The Plan's policies regarding resource lands are intended to satisfy Goal 8 of the GMA that states that the Plan should "maintain and enhance natural resource-based industries, including agricultural, forestry, and mineral resource extraction." The Mineral Resource Map of the Plan identifies both the Lower and Upper Sites as areas that potentially contain mineral resources.

The 1994 King County Zoning Code (Title 21A) implements the King County Comprehensive Plan's policies and objectives. Title 21A limits mineral extraction use to the Forest (F) and Mineral (M) zones compared to the pre-1994 Zoning Code, which allowed mining use in all zones, subject to the requirements of the Unclassified Use Permit. The zoning of the sites under Title 21A is F. In general, compared to the pre-1994 Zoning Code, Title 21A limits the number of zones in which mining is permitted or conditionally permitted (F and M zones) but provides a less cumbersome review process for mining proposals in F and M zones.

Periodic review of all extractive and processing operations in King County is conducted at least every 5 years (KCC 21A.22.050). The periodic review is used to determine if the site is continuing to operate consistent with the most current standards and to establish other conditions as necessary to mitigate identifiable environmental impacts.

The consistency of the Proposal with relevant state, regional, and local plans, policies, and regulations is discussed in Appendix H. Policies discussed in Appendix G include the Washington State Growth Management Act, State Shoreline Management Act, State Forest Practices Act, King County Comprehensive Plan, King County Zoning Code, Snoqualmie Valley Community Plan, North Bend Comprehensive Plan and Vision Plan, and the National Scenic Byways Program.

9.2.3 Cumulative Impacts

The Homestead Valley Mine immediately south of the Upper Site, the King County Public Works gravel storage yard on SE Middle Fork Road, and the Old Stone Quarry on SE North Bend Way are the only active mining operations in the immediate vicinity. The Snoqualmie Sand and Gravel Mine is also located in the general vicinity, approximately 5 miles to the northwest. Because the location of mining operations is largely based on suitability of site resources and land use designations, the addition of the proposed mining operation is not expected to increase pressure for additional mining operations in the area and, therefore, would not change nearby land uses to mining.

9.3 Mitigation Measures

9.3.1 Alternative 1-No Action

No mitigation for land use impacts would be needed under Alternative 1.

9.3.2 Alternatives 2, 3, and 4 (Including Limited Lower Site Mining)

The following features of the proposed project would limit land use impacts:

- The proposed mining would be phased. Upon completion of mining within an individual phase, the mined area would be reclaimed, thus limiting the amount of mining activity during any given time. Each reclaimed mined area would be offered for donation to WDNR, thus ensuring a return of that mined area to long-term commercial forestry.
- A naturally vegetated buffer would be retained around the perimeter of the Lower and Upper Sites to buffer nearby residential uses from the proposed mining and processing activities. The processing facilities would be located on the floor of the mine pit.

- The ultimate reclamation of the Upper and Lower Sites, following the conclusion of mining activities, would include the following:
 (1) pre-mining site preparation, including use of overburden material;
 (2) slope stabilization and erosion control, including stormwater control and temporary erosion-control measures such as hydroseeding and filter fence check dams;
 (3) final contouring and topsoil placement; and
 (4) revegetation with trees.
- Dust and noise levels from proposed mining and processing activities would be minimized by paving access roads, installing a tire wash system, maintaining shelter belts of trees, building and planting berms, orienting asphalt plant east to west and maintaining a 25-mph speed limit (refer to the Noise and Air Quality Chapters for details).

9.4 Significant Unavoidable Adverse Impacts

The forest land character of portions of the Lower and Upper Sites would temporarily change (for up to 25 years) under Alternatives 2 and 3, and a portion of the Upper Site would temporarily change under Alternative 4. The proposed mining and processing activity at the Lower Site under Alternatives 2 and 3 would result in a significant unavoidable adverse impact because of the temporary conversion of forest use.